99689-00019 Appln. No.:10/082,476

Amendment Dated July 18, 2005

Reply to Office Action of January 18, 2005

Amendments to the Claims: This listing of claims will replace all prior versions, and listings, of claims in the application

## Listing of Claims:

- (Canceled) 1. '
- (Canceled) 2.
- (Canceled) 3.
- (Canceled) 4.
- (Canceled) 5.
- (Canceled) 6.
- (Canceled) 7.
- (Canceled) 8.
- (Canceled) 9.
- (Canceled) 10.
- (Canceled) 11.
- (Canceled)
- 12. A cell-free composition for the modification of DNA sequence (Currently Amended) 13. comprising:
- a. A duplex DNA comprising an antibiotic resistance gene or a lacZ gene, wherein said antibiotic resistance gene or said LacZ gene contains a target sequence;
- b. an oligonucleotide capable of introducing a site specific, predetermined change in said target sequence, wherein said oligonucleotide comprises a single stranded oligonucleotide;
  - c. a cell-free extract of a plant cell and
  - d. a reaction buffer;

wherein the duplex DNA is a plasmid, bacteriophage, or bacterial artificial chromosome.

- The composition of claim 13, wherein said oligonucleotide (Previously Presented) 14. comprises at least 20 and less than or equal to 200 nucleotides.
- (Cancelled) **15**.
- The composition of claim 13, wherein said oligonucleotide (Previously Presented) 16. comprises a single 3' end and a single 5' end.
- The composition of claim 13, wherein sald antibiotic (Currently Amended) 17. resistance gene or said lacZ gene duplex DNA is a portion of a gene of interest that is

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operably linked to a promoter, so that said gene of interest can be expressed in a host organism.

- 18. (Canceled)
- 19. (Canceled)
- 20. (Canceled)
- 21. (Canceled)
- 22. (Canceled)
- 23. (Canceled)
- 24. (Canceled)
- 25. (Canceled)
- 26. (Canceled)
- 27. (Canceled)
- 28. (Canceled)
- 29. (Previously Presented) The composition of claim 13, wherein sald oligonucleotide comprises a contiguous single-stranded self-complementary oligonucleotide having a 3' end and a 5' end, wherein sald 3' end and said 5' end are juxtaposed and wherein at least five contiguous nucleotides are Watson-Crick base paired, the sequence of said oligonucleotide comprising a template for said modified DNA sequence.
- 30. (Currently Amended) The composition of claim 29, wherein said antibiotic resistance gene or said lacZ gene duplex DNA is a portion of a gene of interest that is operably linked to a promoter, so that said gene of interest can be expressed in a host organism.
- 31. (Previously Presented) The composition of claim 30, wherein said duplex DNA is a plasmid.
- 32. (Previously Presented) The composition of claim 17, wherein said duplex DNA is a plasmid.
- 33. (New) A cell-free composition for the modification of DNA sequence comprising:
  - a. A duplex DNA comprising a target sequence;
- b. an oligonucleotide capable of introducing a site specific, predetermined change in said target sequence, wherein said oligonucleotide comprises a DNA duplex;
  - c. a cell-free extract of a plant cell and
  - d. a reaction buffer;
  - wherein the duplex DNA is a plasmid, bacteriophage, or bacterial artificial chromosome.
- 34. (New) The composition of claim 33, wherein said oligonucleotide comprises at least 20 and less than or equal to 200 nucleotides.

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- 35. (New) The composition of claim 33, wherein said oligonucleotide comprises at least 10 and less than or equal to 100 Watson-Crick nucleotide pairs.
- 36. (New) The composition of claim 33, wherein said oligonucleotide comprises a single 3' end and a single 5' end.
- 37. (New) The composition of claim 33, wherein said duplex DNA is a portion of a gene of interest that is operably linked to a promoter, so that said gene of interest can be expressed in a host organism.
- 38. (New) The composition of claim 33, wherein said oligonucleotide comprises a contiguous single-stranded self-complementary oligonucleotide having a 3' end and a 5' end, wherein said 3' end and said 5' end are juxtaposed and wherein at least five contiguous nucleotides are Watson-Crick base paired, the sequence of said oligonucleotide comprising a template for said modified DNA sequence.
- 39. (New) The composition of claim 38, wherein said duplex DNA is a portion of a gene of interest that is operably linked to a promoter, so that said gene of interest can be expressed in a host organism.
- 40. (New) The composition of claim 39 wherein said duplex DNA is a plasmid.
- 41. (New) The composition of claim 37 wherein said duplex DNA is a plasmid.